Concerning: Zimmerman A, Wozniewski M, Szklarska A, Lipowicz A, Szuba A. Efficacy of manual lymphatic drainage in preventing secondary lymphedema after breast cancer surgery. Lymphology 2012, 45, 103-112.

Letter to the editor: Devoogdt N, Christiaens MR, Van Kampen M. Efficacy of manual lymphatic drainage in preventing secondary lymphedema after breast cancer surgery. Lymphology 2012, 45(4), 188-189.

Dear editor,

We have read with great interest the article written by Zimmermann et al (1). The authors of this RCT concluded that manual lymph drainage (MLD) applied immediately after the surgery is effective to prevent breast cancer-related arm lymphoedema.
We do not agree with this conclusion:
1) To investigate the preventive effect of MLD on the development of arm lymphoedema, the primary outcome has to be incidence of objective arm lymphoedema. The authors did not report how many patients have developed arm lymphoedema in the group receiving preventive MLD and in the group not receiving preventive MLD at 6 months post-surgery and they did not report the statistical difference between both groups.
2) The power of the study is very low. They only included 67 breast cancer patients. Of this small sample size, half of the patients underwent a sentinel lymph node biopsy, which is associated with a very small risk to develop arm lymphoedema (2,3). The other half of the patients underwent an axillary lymph node dissection and is associated with 15% risk of development of arm lymphoedema at 6 months post-surgery (4). So, we estimate that only 5 patients have developed objective arm lymphoedema at 6 months post-surgery. It is not possible to make conclusions on such a very small group that have developed arm lymphoedema.

We also have following additional remarks:
The authors state that professional-based therapies (such as MLD, pneumatic compression, laser therapy) result in greater arm volume reduction than self-performed therapies (such as garment wear, exercises and limb elevation). Furthermore, they state that application of MLD results in 25% additional volume reduction. To our knowledge, these statements are not correct. The first statement has never been examined. Concerning the second statement, 4 RCTs investigating the treatment effect of MLD mentioned an additional lymphoedema volume reduction of maximum 7% (5).

References:
1. Zimmermann A, Wozniewski M, Szklarska A, Lipowicz A, Szuba A. Efficacy of manual lymphatic drainage in preventing secondary lymphedema after breast cancer surgery. Lymphology. 2012;45:103-112.
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3. Leidenius M, Leivonen M, Vironen J, von Smitten K. The consequences of long-time arm morbidity in node-negative breast cancer patients with sentinel node biopsy or axillary clearance. J Surg Oncol. 2005;92:23-31.
4. Devoogdt N, Christiaens MR, Geraerts I, et al. Effect of manual lymph drainage in addition to guidelines and exercise therapy on arm lymphoedema related to breast cancer: randomised controlled trial. BMJ. 2011;343:d5326.
5. Devoogdt N, Van Kampen M, Geraerts I, Coremans T, Christiaens MR. Different physical treatment modalities for lymphoedema developing after axillary lymph node dissection for breast cancer: a review. Eur J Obstet Gynecol Reprod Biol. 2010;149:3-9.